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EXAMINER

LUI, DONNA V

ART UNIT PAPER NUMBER

2629

DATE MAILED: 11/22/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

10/715,960

Applicant(s)

EMERSON ET AL.

Examiner

Donna V. Lui

Art Unit

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 09/20/2006.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-36 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-36 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☐ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____.
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: _____.

DETAILED ACTION

Inventorship

1. This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of the various claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary. Applicant is advised of the obligation under 37 CFR 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to consider the applicability of 35 U.S.C. 103(c) and potential 35 U.S.C. 102(e), (f) or (g) prior art under 35 U.S.C. 103(a).

Claim Rejections - 35 USC § 102

2. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

3. **Claims 1, 2, 17, 35 and 36** are rejected under 35 U.S.C. 102(b) as being anticipated by Nakamura (Pub. No.: US 2002/0083098 A1).

With respect to **Claim 1**, Nakamura discloses a method of remotely accessing a computer system by a remote console ([0054]). Nakamura teaches the method to comprise receiving, by an emulation device (See figure 8, element 320), first pointer position data representing a position of a first pointing device coupled to the remote console (*first pointer position data: position of*

mouse cursor; [0095], lines 14-17; See figure 2, element 11: remote console; [0075], lines 7-11), the emulation device to emulate a second pointing device that is of a different type than the first pointing device; and generating, by the emulation device, second pointer position data representing a position of the second pointing device based on the received first pointer position data ([0101]).

With respect to **Claim 17**, Nakamura teaches an apparatus comprising: an interface (*See figure 2, element 20: interface; [0073], lines 1-8*) to receive first pointer position data from a remote console (*element 11: remote console*), the first pointer position data associated with a first pointing device (*[0095], lines 14-17*); and a controller (*See figure 8, element 801; [0092]*) to emulate a second pointing device that is of a different type from the first pointing device, the controller to generate second pointer position data in response to the first pointer position data.

With respect to **Claim 35**, A system comprising: means for receiving first pointer position data from a remote console (*[0075], lines 7-11; See figure 2, terminals 11 and 12, terminal 11 can be a personal computer and terminal 12 can be a workstation; [0076], lines 5-8; the remote console is element 11; first pointer position data is received from the remote console because the client has control of the console which is remote and accessed from the agent*), the first pointer position data representing a position of a first pointing device (*first pointer position data: position of mouse cursor; [0095], lines 14-17*); and means for emulating a second pointing device that is of a different type from the first pointing device, the emulating means for generating second pointer position data in response to the first pointer position data ([0101]).

With respect to **Claim 2**, Nakamura teaches the method of claim 1, further comprising sending the second pointer position data to a software module in the computer system ([0119], lines 5-9; [0120], lines 1-6).

With respect to **Claim 36**, the system of claim 35, Tjong teaches the means for emulating the second pointing device comprises a means for emulating a tablet device ([0049], lines 7-12).

4. **Claims 32-34** are rejected under 35 U.S.C. 102(b) as being anticipated by Tjong et al (Pub. No.: US 2005/0138215 A1).

With respect to **Claim 32**, Tjong teaches a console (See figure 8, element 800) comprising: a first pointing device (element 838; [0076]); an interface to communicate absolute pointer position data to a computer system over a link (element 840; [0049]; [0078] absolute pointer position is associated with the client device being a tablet PC); and a controller (element 804; [0071]) to transform relative pointer position data from the first pointing device to the absolute pointer position data.

With respect to **Claim 33**, the console of claim 32, Tjong teaches the controller (See figure 8, element 804; [0071]) is adapted to transform the relative pointer position data from the first pointing device (element 838) to an intermediate pointer position data (memory; [0073], lines 4-15), and the controller to further transform the intermediate pointer position data to the

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absolute pointer position data based on characteristics of a second pointing device being emulated by an emulation device coupled to the computer system (*transformation is accomplished through the system bus 808 and the network adapter 854*).

With respect to **Claim 34**, the console of claim 33, Tjong teaches the controller is adapted to transform the intermediate pointer position data to the absolute pointer position data based on characteristics of a tablet device being emulated by the emulation device in the computer system ([0049], lines 7-12).

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

5. **Claims 3-16 and 18-31** are rejected under 35 U.S.C. 103(a) as being unpatentable over Nakamura as applied to claims 1 and 2 above, and further in view of Tjong.

With respect to **Claim 3**, the method of claim 2, Nakamura does not mention generating the second pointer position data comprises generating pointer position data associated with a tablet device.

Tjong teaches generating pointer position data associated with a tablet device (*tablet PC*; [0003]; [0056]).

It would have been obvious for a person of ordinary skill in the art at the time the invention was made to generate pointer position data associated with a tablet, as taught by Tjong, to the method of remotely accessing a computer system by a remote console of Nakamura, so as to provide versatility to the user in communicating with the host computer ([0039]).

With respect to **Claim 4**, the method of claim 3, Nakamura teaches receiving the first pointer position data comprises receiving pointer position data representing a position of a mouse device ([0095], lines 14-17).

With respect to **Claim 5**, the method of claim 3, Nakamura teaches receiving the first pointer position data comprises receiving pointer position data representing a position of a pointing device that provides relative pointer position data to indicate movement of the pointing device ([0095], lines 14-17).

With respect to **Claim 6**, the method of claim 5, Nakamura teaches obtaining the position of a cursor used as a reference for remote pointer synchronization ([0095], lines 14-17). Nakamura does not mention receiving the first pointer position data comprises receiving absolute pointer position data.

As stated in claim 3, Tjong teaches generating pointer position data associated with a tablet device (*tablet PC*; [0003]; [0056]). A tablet device is a grid, thus any point on the tablet associated with the cursor comprises absolute pointer position data.

It would have been obvious for a person of ordinary skill in the art at the time the invention was made to use pointer position data comprised of receiving absolute pointer position data, as taught by Tjong to the method of remotely accessing a computer system by a remote console of Nakamura, resulting in receiving first pointer position data comprising receiving absolute pointer position data so as to make PC operation more intuitive for example with absolute coordinates a pen placed at the bottom left corner of the tablet corresponds to the cursor on the screen moved to the bottom left corner of the computer screen.

With respect to **Claims 7, 8 and 9**, the method of claims 6, 7 and 2 respectively, Nakamura does not mention generating the second pointer position data comprises generating absolute pointer position data, absolute pointer position data of an emulated tablet device nor does Nakamura mention generating pointer position data representing a position in a grid associated with a tablet device.

Tjong teaches generating absolute pointer position data of an emulated tablet device (*tablet PC*; [0003]; [0056]). A tablet device is a grid, thus any point on the tablet associated with the cursor comprises absolute pointer position data.

It would have been obvious for a person of ordinary skill in the art at the time the invention was made to use pointer position data comprised of generating absolute pointer position data of an emulated tablet device, as taught by Tjong to the method of remotely accessing a computer system by a remote console of Nakamura, resulting in generating the second pointer position data comprises generating absolute pointer position data of an emulated tablet device so as to make PC operation more intuitive for example with absolute coordinates a

pen placed at the bottom left corner of the tablet corresponds to the cursor on the screen moved to the bottom left corner of the computer screen.

With respect to **Claims 10 and 27**, the method of claims 1 and 17 respectively, Nakamura teaches a collaboration server for interfacing between terminal devices 11 and 12 of figure 1. Nakamura does not mention generating the second pointer position data by the emulation device comprises generating the second pointer position data by an emulated Universal Serial Bus (USB) human interface device.

Tjong teaches a USB connection is used for interfacing for point-to-point communication ([0061]).

It would have been obvious for a person of ordinary skill in the art at the time the invention was made to generate second pointer position data by an emulated universal serial bus human interface device, as taught by Tjong, to the method of remotely accessing a computer system by a remote console of Nakamura, so as to provide ease of use, expandability, and speed for the end user.

With respect to **Claim 11**, the method of claim 10, Nakamura does not mention sending the second pointer position data from the emulated USB human interface device to a USB host controller.

Tjong teaches sending the second pointer position data from the emulated USB human interface device (See figure 5, elements 534 and 536) to a USB host controller (See figure 5, element 502; [0047]).

It would have been obvious for a person of ordinary skill in the art at the time the invention was made to send the second pointer position data from the emulated USB human interface device to a USB host controller, as taught by Tjong, to the method of remotely accessing a computer system by a remote console of Nakamura, so as to provide ease of use, expandability, and speed for the end user.

With respect to **Claim 12**, the method of claim 1, Nakamura does not mention generating the second pointer position data by the emulation device comprises generating the second pointer position data by an emulated PS/2 input device.

Although Nakamura does not mention the use of a PS/2 input device it would have been obvious for a person of ordinary skill in the art to generate the second pointer position data by an emulated PS/2 input device, such as a mouse, to the method of remotely accessing a computer system by a remote console of Nakamura, so as to reduce costs.

With respect to **Claim 13**, the method of claim 1, Nakamura does not mention generating the second pointer position data by the emulation device comprises generating the second pointer position data by an emulated PS/2 tablet device.

Tjong teaches generating the second pointer position data by an emulated tablet device (*tablet PC*; [0003]; [0056]). Tjong does not mention the emulated tablet device is a PS/2 tablet device. Although Tjong does not mention the use of a PS/2 input device it would have been obvious for a person of ordinary skill in the art to generate the second pointer position data by an emulated PS/2 tablet device, to the method of remotely accessing a computer system by a remote

console of Nakamura, so as to reduce costs, and to provide versatility to the user in communicating with the host computer (*Tjong: [0039]*).

With respect to **Claim 14**, the method of claim 1, Nakamura does not mention emulating with the emulation device, a USB human interface device and a USB controller.

Tjong teaches sending the second pointer position data from the emulated USB human interface device (*See figure 5, elements 534 and 536*) to a USB host controller (*See figure 5, element 502; [0047]*).

It would have been obvious for a person of ordinary skill in the art at the time the invention was made to emulate with the emulation device, a USB human interface device and a USB controller, as taught by Tjong, to the method of remotely accessing a computer system by a remote console of Nakamura, so as to provide ease of use, expandability, and speed for the end user.

With respect to **Claim 15**, the method of claim 14, Tjong further teaches sending the second pointer position data onto a system bus (*See figure 8*).

With respect to **Claim 16**, the method of claim 1, wherein sending the second pointer position data onto the system bus comprises sending the second pointer position data onto a Peripheral Component Interconnect (PCI) bus (*[0070], lines 5-10*).

With respect to **Claim 18**, the apparatus of claim 17, Nakamura does not mention the

apparatus further comprising an operating system, the operating system to receive the second pointer position data. Official Notice is taken that concept of providing and receiving data by the operating system, which includes receiving second pointer position data, is well known and expected in the art. It would have been obvious to have an operating system to receive the second pointer position data in the apparatus of Nakamura so as to reduce the amount of circuitry and reduce costs.

With respect to **Claim 19**, the apparatus of claim 18, Nakamura teaches the apparatus further comprising a server, the operating system executable in the server (*See figure 1, element 1: collaboration server; [0071]*).

With respect to **Claim 20**, the apparatus of claim 19, Nakamura teaches the apparatus further comprising a server management device (*See figure 2, element 23: Cashe manager ~ server management device*) including the interface (*See figure 2, element 20: collaboration server ~ interface*) and the controller (*See figure 3 and figure 8, element 801*), the server management device coupled to the server (*See figure 2*).

With respect to **Claim 21**, the apparatus of claim 20, Nakamura teaches the server management device is part of the server (*See figure 2*).

With respect to **Claim 22**, the apparatus of claim 17, Nakamura does not mention the controller is adapted to emulate a second pointing device that is a tablet device.

Tjong teaches a controller (*See figure 6, element 618; [0055], lines 1-4*) is adapted to emulate a second pointing device that is a tablet device (*tablet PC; [0003]; [0056]*).

It would have been obvious for a person of ordinary skill in the art at the time the invention was made to have a controller adapted to emulate a second pointing device that is a tablet device, as taught by Tjong, to the apparatus of Nakamura, so as to provide versatility to the user in communicating with the host computer (*[0039]*).

With respect to **Claim 23**, the apparatus of claim 22, Nakamura teaches the first pointer position data represents a position of a mouse device coupled to the remote console (*[0095], lines 14-17*).

With respect to **Claim 24**, the apparatus of claim 23, Nakamura teaches the first pointer position data represents a position of a pointing device that provides relative pointer position data to indicate movement of the pointing device (*[0095], lines 14-17*).

With respect to **Claim 25**, the apparatus of claim 24, Nakamura teaches obtaining the position of a cursor used as a reference for remote pointer synchronization (*[0095], lines 14-17*). Nakamura does not mention the first pointer position data comprises absolute pointer position data.

Tjong teaches generating pointer position data associated with a tablet device (*tablet PC; [0003]; [0056]*). A tablet device is a grid, thus any point on the tablet associated with the cursor comprises absolute pointer position data.

It would have been obvious for a person of ordinary skill in the art at the time the invention was made to have first pointer position data comprised of absolute pointer position data, as taught by Tjong to the apparatus of Nakamura, so as to make PC operation more intuitive for example with absolute coordinates a pen placed at the bottom left corner of the tablet corresponds to the cursor on the screen moved to the bottom left corner of the computer screen.

With respect to **Claim 26**, the apparatus of claim 25, Nakamura does not mention the second pointer position data comprises absolute pointer position data.

Tjong teaches generating absolute pointer position data of a tablet device (*tablet PC*; [0003]; [0056]). A tablet device is a grid, thus any point on the tablet associated with the cursor comprises absolute pointer position data.

It would have been obvious for a person of ordinary skill in the art at the time the invention was made to have the pointer position data comprised of absolute pointer position data, as taught by Tjong to the apparatus of Nakamura, resulting in generating the second pointer position data comprised of absolute pointer position data so as to make PC operation more intuitive for example with absolute coordinates a pen placed at the bottom left corner of the tablet corresponds to the cursor on the screen moved to the bottom left corner of the computer screen.

With respect to **Claim 28**, the apparatus of claim 27, Nakamura teaches a collaboration server for interfacing between terminal devices 11 and 12 of figure 1. Nakamura does not

mention a USB host controller to receive the second pointer position data from the USB human interface device.

Tjong teaches a USB connection is used for interfacing for point-to-point communication ([0061]) and the USB host controller (*See figure 5, element 520*) to receive the second pointer position data from the USB human interface device (*See figure 5, elements 534, 536, 518*).

It would have been obvious for a person of ordinary skill in the art at the time the invention was made to have a USB host controller to receive the second pointer position data from the USB human interface device, as taught by Tjong, to apparatus of Nakamura, so as to provide ease of use, expandability, and speed for the end user.

With respect to **Claim 29**, the apparatus of claim 28, Tjong teaches the controller comprises a USB device controller ([0076]; *See figure 8, element 804*).

With respect to **Claim 30**, the apparatus of claim 17, Nakamura does not mention the controller is adapted to emulate a PS/2 tablet device.

Tjong teaches a controller (*See figure 6, element 618*) is adapted to emulate a tablet device (*tablet PC; [0003]; [0056]*). Tjong does not mention the emulated tablet device is a PS/2 tablet device. Although Tjong does not mention the use of a PS/2 input device it would have been obvious for a person of ordinary skill in the art to generate the second pointer position data by an emulated PS/2 tablet device, to the apparatus of Nakamura, so as to reduce costs, and to provide versatility to the user in communicating with the host computer (*Tjong: [0039]*).

With respect to **Claim 31**, the apparatus of claim 17, Nakamura does not mention the controller is adapted to emulate a USB human interface device and a USB host controller.

Tjong teaches the controller is adapted to emulate a USB human interface device (*See figure 5, elements 534 and 536*) and a USB host controller (*See figure 5, element 502; [0047]*).

It would have been obvious for a person of ordinary skill in the art at the time the invention was made to have the controller adapted to emulate a USB human interface device and a USB host controller, as taught by Tjong, to the method of remotely accessing a computer system by a remote console of Nakamura, so as to provide ease of use, expandability, and speed for the end user.

Response to Arguments

6. Applicant's arguments filed 9/20/2006 have been fully considered but they are not persuasive.

1.) Applicant argues that the synchronization of remote pointers based on the location of markers and web pages, as performed in Nakamura, is completely different from the subject matter recited in claim 1. Applicant argues that there is no component of Nakamura that performs any emulation.

The examiner disagrees. Nakamura teaches a collaboration system ([0054]) where collaboration is equivalent to a remote pointer that is a pointer displayed for a cooperative

operation, and when the remote pointer is moved by one terminal accordingly (e.g., terminal A), the remote pointer displayed by another terminal (e.g., terminal B) is moved ([0002], lines 11-16). Therefore, collaboration is equivalent to remotely accessing a computer system by a remote console and the teachings of Nakamura comprise the limitations recited in claim 1. As defined by www.dictionary.com, emulate is defined as another computer enabling it to do the same work as the first. Thus, Nakamura teaches terminal B to emulate terminal A, since terminal B is synchronized to terminal A, terminal B performs the same pointer movements and functions as terminal A.

2.) Applicant argues that there is nothing in Nakamura that suggests one terminal device would emulate a second pointing device that is of a different type than the first pointing device.

The examiner disagrees. That fact that there exists two terminals, terminal A and terminal B, such that the pointer of one terminal is used as a reference for the synchronization of another terminal, is evidence that two different pointing devices are in use where the pointing device of terminal B is synchronized to terminal A such that the second pointing device (pointing device of terminal B) emulates the first pointing device (pointing device of terminal A) ([0061], *note that the transmission side terminal device is equivalent to terminal A and the reception side terminal device is equivalent to terminal B*).

3.) Applicant argues that Nakamura does not teach the limitations of claim 17 as similarly applied to claim 1.

The examiner disagrees. Please see the above discussion with respect to arguments one and two.

4.) Applicant argues that it is unclear what is meant by “client device being a tablet PC” since paragraph [0078] does not mention either “client device” or “tablet PC”

The examiner cited both paragraph [0049] and [0078]. Please see paragraph [0049], lines 7-12, which clearly states that the host computing device can be linked with any mobile client device such as a tablet PC. Paragraph [0049] is cited to teach absolute pointer position data. Please see page 6, paragraph [0023], lines 30-32 of applicant’s specification where applicant admits that a feature of a tablet or touch screen is that movement is reported as absolute coordinates to the operating system of the system to which the tablet or touch screen is coupled.

Conclusion

7. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event,

however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Donna V. Lui whose telephone number is (571) 272-4920. The examiner can normally be reached on Monday through Friday 8:30 a.m. - 5:00 p.m..

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Amr Awad can be reached on (571)272-7764. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

Donna V Lui
Examiner
Art Unit 2629

AMR A. AWAD
SUPERVISORY PATENT EXAMINER
